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ABSTRACT

To encourage states to share information about teacher professional development strategies and initiatives the State Higher Education Executive Officers (SHEEO) sponsors the SHEEO-Eisenhower Education Network, an offshoot of the Eisenhower Professional Development Program, which focuses on long-term, content-specific support for teachers, including the need to strengthen the content knowledge and pedagogical skills of new teachers and reduce high teacher attrition. The introductory section of the document reviews the background of the program and offers an overview of how the program might be used by states for teacher induction purposes, including smoothing the transition of beginning teachers from novice to professional; familiarizing beginning teachers with the responsibilities of teaching and the school culture; and increasing beginning teacher competency. It also sets out several strategies for keeping teachers in the classroom; these include (1) identifying the needs of novice teachers; (2) building a cadre of mentors and master teachers to guide quality instruction at the school site; (3) ensuring adequate resources to support effective practice; (4) creating school-college partnerships to support beginning teachers; (5) helping teachers build subject matter knowledge and how to teach it; and (6) using evaluation and program review to improve teachers and programs. Appended is a list, by state, of selected Eisenhower teacher induction programs. (SM)

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ED 445 587

Teacher Success

SHEEO A Report of the State Higher Education Executive Officers/Eisenhower Coordinators Network December 1999

State Higher Education Support for Beginning Teachers

The first-year teacher faces unique problems. The leap from college student to classroom practitioner is exceptionally wide. Teachers must not only be competent in their subject and know how to teach it, they must maintain a climate in which teaching and learning can take place. A teacher's personality is sufficiently exposed in teaching that his or her persona is almost transparent. This is a threatening, anxiety-producing situation for a novice, who is just beginning to establish a professional self-concept.

Newly licensed teachers are prepared to *begin* to teach, but they are not thoroughly proficient. They are also not ready to fine-tune their competence without assistance and support. A complete conception and a realistic awareness of being a teacher cannot be gained entirely, simulated exactly, or understood sufficiently in pre-service training. Even a superb student teaching experience lacks the completeness and the realism of a first teaching job.

Assisting the Beginning Teacher
Association of Teacher Educators, 1989

C. Walker

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Introduction

One of the key issues targeted by current efforts to build quality teacher workforces across the country is the need to support teachers who are beginning their professional careers. According to recent surveys conducted by the National Association of State Directors of Teacher Education and Certification (NASDTEC)[1], reviews of selected recent state legislation, and other studies,[2] over 30 states (through the state education board, legislature, or governor) have or are proposing policies to support beginning teachers. In a survey completed last year by the National Council for the Accreditation of Teacher Education (NCATE), 14 of 37 states responding were revising their teacher standards to include a two-tiered credential to provide an additional level of performance for new teachers to pass before they received their license. Of the same 37 states, 21 were adding new beginning teacher programs, either as state pilots or as new mandates for local districts. Because teacher induction is one component of the new pre-service initiatives

encouraged by the U.S. Department of Education under the recent federal Teacher Enhancement Grant Program, Title II of the Higher Education Act, many more new state and local models will appear in the coming years.

To link these emerging state and local activities, at the SHEEO/Eisenhower Network meeting in November 1998 and subsequent subcommittee meeting in February 1999, a majority of participating state higher education coordinators expressed an interest in examining and promoting programs targeting the professional development of newly hired and beginning teachers. The coordinators developed a rationale for using Eisenhower higher education resources for beginning teacher support and a plan to encourage states to *voluntarily* use some of their higher education Eisenhower funds for induction purposes.

Because the Eisenhower Professional Development Program is focused on long-term, content-specific support for teachers, it can address key concerns of state and local education leaders. These include the need to strengthen the content knowledge and pedagogical skills of new teachers and reduce high teacher attrition, especially in high-need disciplines such as mathematics and science. Examination of recent studies indicates that policies are in place to support beginning teachers. However, only a handful of states fund and evaluate these activities and consequently very few effective models of statewide induction programs exist to influence and help local districts shape needed programs.

Through the competitive grant component of the Eisenhower Professional Development Program, state higher education agencies have the flexibility to target valuable resources toward proven strategies that improve teacher performance and student achievement. At the same time, these dollars influence critical collaboration between colleges and universities and local school districts by supporting induction programs. In a number of states, Eisenhower dollars are being used to leverage other federal and state funds (for example, Title II Teacher Enhancement Grants and Goals 2000 funds) to meet the needs of entry-level teachers. Many of these activities include collaboration between state higher education agencies and state departments of education and/or teacher licensing boards. This issue of *Teacher Success* focuses on the needs of the beginning and novice teacher. It identifies characteristics of quality teacher induction programs and provides examples of promising practices including programs collaboratively funded by the federal Elementary and Secondary Education Act, Title II, Eisenhower Professional Development Program administered by state higher education agencies.

To encourage states to share information about teacher professional development strategies and initiatives supported by the Eisenhower Professional Development Program, SHEEO sponsors the SHEEO-Eisenhower Higher Education Network. Issues of *Teacher Success*, information about state-level activities, and links to the SHEEO work, as well as other national activities on teacher quality are available on the SHEEO web site at www.sheeo.org/teacher/teacher-home.html.

Making a Case for Beginning Teacher Support

The calls for increasing support for beginning teachers are not new. Over the past two decades, teacher reform advocates and national reports have urged state and local education policy leaders to support initiatives that assist novice teachers.[3] Current studies reinforce previous findings.[4] The primary reasons for developing formal induction programs include the following:

The need to provide support and guidance to help smooth the transition of beginning teachers from novice to professionals. Programs that provide support for beginning teachers move away from traditional practices in which new teachers generally assume full workloads that isolate them in their classrooms. According to some teacher reform advocates, this "sink or swim" practice prevents new teachers from learning how to effectively link and adapt their knowledge and skills to specific expectations of the employing school district, school and classroom. Recent state-level induction programs for new teachers include support for up to two years. These programs often include orientations, formal mentors, peer networking, observations and assessments of instructional practice and classroom management, workshops and seminars.

The need to familiarize beginning teachers with the responsibilities of teaching and the culture of the schools where they teach. Mentoring is an effective mechanism for one-on-one professional guidance and for cultivating a teaching culture in which expert teachers serve as an essential resource for new teachers. Such relationships are particularly useful for new teachers as they seek to develop effective teaching practices. A 1998 study by the U.S. Department of Education found that three out of five new teachers had been mentored by another teacher in the last year, suggesting that schools and/or teachers recognize the importance of such relationships early in a teacher's career. In addition, among the teachers who had been mentored within that time period, 45 percent with three or fewer years of teaching experience believed it improved their teaching a lot, compared with only 18 percent of teachers with 20 or more years' experience.[5]

The need to increase the competency of beginning teachers by improving their content knowledge and professional skills. One of the most critical goals of professional development is to increase teacher effectiveness. New teachers are learners—in fact, they are on the very steepest part of their learning curves. Research suggests that what happens to beginning teachers during their early years on the job determines not only whether they stay in teaching but also what kind of teachers they become.

The need to assess beginning teachers to ensure that they can perform the duties of teaching and that they are an effective "match" for their particular school. Most induction programs focus on helping new teachers gain experience and familiarity with district and school policies, curriculum content, and teaching methods. In addition, programs often offer novice teachers strategies for classroom management, and advising students and parents. In some states, teacher induction is linked to licensure and certification. Recent changes in many state requirements evaluate teachers during and at the completion of induction programs to determine their

continued eligibility to teach.

The need to increase retention of teachers in a particular geographic location or in a particular subject area. Teacher attrition also is cited as a concern. According to Recruiting New Teachers, Inc., nationally more than 20 percent of new teachers leave the classroom within the first three years of practice and nearly 10 percent leave in the first year alone. School districts see induction programs as a strategy to keep new teachers. A recent study of teacher induction programs in 10 urban school districts show that a majority of participating districts posted between 90 percent to 100 percent retention of their inductees over a five-year period.[6]

Strategies for Keeping the Best and the Brightest Teachers in the Classroom

Research on what makes up an effective teacher induction program is sparse. Local programs are rarely evaluated and, as indicated in the following section, the few state-level programs now in operation were enacted only within the last five years. However, some educators are beginning to document their activities; through this we can gain insight into both what works and where gaps still exist. The following descriptions of local and state strategies could be used as models for emerging state and national efforts.

Identifying the needs of the novice teacher

The needs of novice teachers are qualitatively different from those of more experienced teachers in terms of knowledge, skill and basic management. Furthermore, not all novice teachers are alike. The term "novice teacher" refers to three distinct types of beginning teachers: (1) teachers just completing their undergraduate programs and new to teaching, (2) the experienced scientist or engineer making a mid-career change to teaching, and (3) the veteran teacher who has changed schools, grades, or subject areas. A "one-size-fits-all" approach to the academic-year beginning support system may not work, and programs need to vary support elements and the amount of support per individual teacher to accommodate these differences.

Directors of induction programs suggest that while "mid-career changers" tend to thrive in these programs because of a hunger for pedagogical training, and veteran teachers excel because of a need for rich content experiences, the new teacher with only some student teaching experience, little practical content experience, and limited life experience can be easily overwhelmed. The level of maturity may also be an important factor. Recent studies show that the youngest teachers may not use the most innovative or effective strategies for teaching and learning, even when they have come from pre-service programs that introduce these strategies. It appears that most rapid introduction of innovative teaching strategies generally occur during a teacher's third through fifth years, and sooner for older teachers or teachers who start with strong content backgrounds. Thus, the youngest, least experienced teachers may need longer and more concentrated support.

Implemented in 1989, Connecticut's *Beginning Educator Support and*

Training (BEST) Program was redesigned in 1997 to include phases for teacher growth and development over the first two years of a teacher's initial hire. Embedded in the program is the Connecticut Competency Instrument (CCI), used to measure, within a single lesson, generic teaching competencies that are common across all grade levels and content areas (such as classroom management, instruction and assessment). In addition, content-focused portfolio assessments have been developed to evaluate beginning teacher's planning, teaching and assessment of student learning over a unit of instruction.

During the first year of teaching, mentors or mentor teams work with beginning teachers to develop such fundamental teaching skills as classroom management, instruction and student assessment. Attainment of these essential competencies is assessed through the CCI. Beginning teachers are encouraged to participate in CCI Clinics and content-focused support seminars. The support seminars, which begin during year one and continue into year two, provide beginning teachers with opportunities to explore the meaning of professional teaching standards within their discipline or content area, to experience models of teaching and learning, to share ideas with each other, and to reflect on their practice to better facilitate student learning.

During the second year of teaching, beginning teachers focus their attention on the development of teaching strategies that foster active student participation in their own learning. They prepare and submit a teaching portfolio, which documents planning, teaching and student learning within a unit of instruction over a two-week period of time, includes multiple sources of information (such as videotapes of teacher-directed instruction and student-centered lessons, teacher commentaries, and samples of student work), and focuses on the teaching of a specific content area or discipline.

Similar to the Connecticut program, the Louisiana *Teacher Assistance Program* was expanded in 1997 and became the *Teacher Assistance and Assessment Program*. The Louisiana Mentor Program, one part of the state program, is designed to help a new teacher become a confident, competent professional in the classroom as quickly as possible and to offer support and assistance as he/she experiences first-year teaching. Local school districts compensate mentors who work with up to two novices per year. Districts match mentor teachers and novices by grade level and subject areas. New teachers in the program receive feedback regarding planning, classroom and instructional strategies; in-classroom observations with feedback in relation to the Louisiana Components of Effective Teaching; and attention, support, and encouragement by mentor teachers.

Beginning teachers need assistance with specific curricular issues within the context of their own classes and students. Many have the content knowledge, but lack the ability to translate the relevance of content instruction into achievable academic goals for their students. Valuable components to statewide induction programs include in-class coaching assistance and support to help beginning teachers to develop curriculum and lesson plans. *The MENTOR Institute: Molding Excellent New Teachers of Reading/Writing*, a program funded through an Eisenhower higher education grant by the

Mississippi Institutes of Higher Learning, is designed to assist first-year teachers develop the knowledge and skills needed to improve the literacy capabilities of elementary students. A collaborative effort of the University of Mississippi School of Education and the North Mississippi Education Consortium, the year-long institute includes seminars and workshops that immerse novice teachers in discussion, demonstrations and hands-on activities that represent the best practices in the integration of reading and writing instruction with technology. Teachers have opportunities to observe lessons being delivered by veteran "master" teachers and discuss pedagogical strategies. Throughout the school year, institute staff work with teachers in their classrooms as coaches and mentors, making recommendations and modeling effective instructional practices as needed. The institute includes evaluation of the program and the participants, including reflections by new teachers of the program's impact on their teaching.

Building a cadre of mentors and master teachers to guide quality instruction at the school site

In *What Matters Most: Teaching for America's Future* , The National Commission on Teaching and America's Future (NCTAF) noted that beginning teachers who receive mentoring become more effective as teachers because they are learning from guided practice rather than trial and error, and they leave teaching at much lower rates. [7] Unfortunately, most beginning teachers never get mentoring support. In a recent national survey of teachers conducted by the U.S. Department of Education, while 70 percent of those who had been mentored by another teacher said that the experience significantly improved their teaching, less than one-fifth have received such guidance.[8]

In our Leadership Institute for Mentor Teachers, we asked veteran teachers to prepare a short essay of any memories from their first year of teaching. The following morning, we asked each to read the essay out loud. We expected to hear the horror stories about having five different preps, no classroom of your own, getting all the worst assignments, etc., and we did. What surprised us was the equal number of beautiful stories about teachers who had found a savior in a colleague across the hall, supportive principals, and receptive schools. In almost all the positive cases, the key was a relationship with one other teacher who took pity on them. Many of these turned out to be lifelong friendships.

What struck us the most was the serendipity of those who received this kind of support. It all seemed to be left to random chance. The obvious conclusion from this exercise: there is no system of support for beginning teachers. It is non-systemic.

Dennis Bartels
Director, Exploratorium Center for Teacher and Learning
San Francisco

Recent data by the U.S. Department of Education indicate that new teachers, compared to veteran teachers, are more likely to report that professional development in classroom management and student discipline issues improved their teaching. Assistance at the school site is most valuable to novices, especially the youngest beginning teachers. The most effective coaches need to spend considerable time helping the novice teacher navigate around the school and securing whatever is needed to support that new teacher. Also, it is the experienced teachers who can remember back to when they were new and help novices develop successful management strategies. The challenge is finding exemplary teachers who are available during school hours and free of full-time classroom service and/or the resources to support their work.

In some programs the solution is identifying recently retired teachers or teachers on leave to fill mentor positions. The mentor teacher qualifications for the Louisiana Program noted earlier include:

- A permanent state teaching certificate and a minimum of three years of teaching experience and five years preferred experience
- A minimum of two years of experience in the school system where he/she will serve as a mentor
- Evidence of excellence in teaching
- Evidence of continuing professional development
- Successful completion of the Louisiana Teacher Assessor Program and the Mentor Training Program
- Willingness to be observed in the classroom.[9]

Ensuring adequate resources to support effective practice

In California, a teacher's credential is tied to a two-year certified teacher induction experience and assessment process called *The Beginning Teacher Support and Assessment Program (BTSA).* Begun in 1992 as a legislative strategy to extend new teachers' prior studies to supervised experiences in schools, each new California teacher will be provided an extensive induction experience consisting of formative assessment, individual support, advanced study, and frequent reflection on the practice of teaching.

Beginning teacher programs need resources to be effective. The California legislation calls for gradual phase-in, and in 1998-99, 74 BTSA programs served only 5,500 first-year and second-year teachers, or 16 percent of the beginning teachers in the state. In addition to scaling up the number of new teachers in the program, mentor teachers or coaches will need to be released from their regular workload to work with novices in the classroom. In California, the state provides about $5,000 per beginning teacher per year, but school districts report adding $3,000 of their own money to that total.

Federal Eisenhower Professional Development grants administered by the California Post-secondary Education Commission relieved some districts of part of the cost of supporting beginning teachers. For example, *PINET (Professional Instruction for New and Established Teachers)* offered at the University of California, Berkeley helps new teachers develop classroom

expertise, knowledge of mathematics content, and leadership. Urban teachers in the San Francisco Bay area in their first or second years of teaching are teamed with experienced mathematics teachers. In addition, mentor teachers help their novice partners become aware of and gain access to school and district resources.

In Texas, results of state surveys of teachers indicate that a critical tool for retaining teachers is better staff development. In particular, school district administrators concerned with attrition rates of new teachers cite induction year programs and mentoring as promising approaches. At the same time, administrators express concerns that districts have insufficient funds to provide mentors with pay and release time. In response, a recent joint report by the Texas Education Agency, Texas Higher Education Coordinating Board, and State Board for Educator Certification called *Texas Teacher Recruitment and Retention Study* recommended a two-year teacher induction program in Texas public schools to assist new teachers. The program would provide resources to link initial preparation and induction into the profession by increasing collaboration between the preparation programs and school districts. In addition, funds would be provided to school districts to support induction activities, including stipends for mentor teacher programs and additional resources to implement a dynamic performance assessment system that will guide the continuing development of new teachers. [10]

The *Teacher Fellows Program* at Southwest Texas State University complements the statewide proposal. The program partners beginning elementary teachers and experienced master teachers. The Teacher Fellows earn a tuition-free graduate degree and a $10,000 fellowship stipend. In addition, they receive on-site intensive classroom support from master teachers and opportunities to build valuable professional networks with their peer teachers in the program. Since 1996-1997, 45 Teacher Fellows have completed their master's degrees.

A similar program in Alabama has shown impressive results. The Jefferson County School District sponsors the TEACH Program to support the professional development of first-year teachers. The new teachers receive a two-year master's degree at no cost (through the University of Alabama at Birmingham), technology training and laptop computer, and close mentoring by highly qualified colleagues. One significant factor in the success of the TEACH program is the support by the district's principals. After seven years of the program, the district's teacher attrition rate is 10 percent, compared to approximately 40 percent for the national average.

Creating school-college partnerships to support beginning teachers

A collegiate pre-service program can never prepare a teacher for everything he or she will need to know in the first years of practice. The early years of teaching experience are qualitatively different for teachers when they finally have full responsibility for their own class, independent of their pre-service program. Colleges and universities will need to partner with schools and school districts to identify and define effective professional development support programs that bridge pre-service preparation programs and on-the-job

support. *The Induction Year Teacher Program* at Texas A&M University in Corpus Christi is designed to meet the needs of beginning teachers and complement the mentoring programs of local school districts. First- and second-year teachers participate in weekly peer share-and-support groups followed by sessions that address the problems of beginning teachers. Additionally, teachers are observed in their classrooms by trained university supervisors. The teacher and the university supervisor discuss individual strengths and areas of concern and together formulate a plan for improvement based on the teacher's individual needs. The program began in 1991 and has graduated almost 200 students from 20 South Texas school districts. Both teachers and districts are pleased with the outcomes. According to a recent survey conducted by the university, 94 percent of program graduates are still teaching and 74 percent gave the program the highest rating for effectiveness. The Corpus Christi Independent School District supports the program by providing scholarships for its first-year teachers.

Helping beginning teachers build subject matter knowledge and how to teach it

The *Exploratorium Teacher Induction Program* offers a unique content-specific focus for new mathematics and science teachers in the San Francisco Bay area. Funded by the National Science Foundation, with additional support from external foundations and a state higher education Eisenhower Program grant from the California Postsecondary Education Commission, the pro-gram expects to generate both greater rates of retention of new teachers and the display of more effective science teaching practices earlier in teachers' careers. According to Exploratorium director Dennis Bartels,

> "[O]ur rationale is that many of these classroom management and student behavior problems are issues of weak curriculum and instruction in disguise. New teachers in our program are immediately introduced into an established community of good practice in science and mathematics education and inducted into the larger guild of mathematics and science teachers. In comparison, new teachers in non-discipline-specific beginning teacher programs do not have the content to help organize their conversation about teaching practice. They have only in common the fact that they are all beginners and have little reason to stay together once the beginning teacher label fades away. The purpose of the Exploratorium Teacher Induction Program is induct new teachers into both the teaching profession as well as the guild of exemplary mathematics and science teachers."

The goals of this content-based induction initiative are to:

- Provide in-depth and ongoing content, pedagogy, and peer support to novice teachers of science, mathematics and technology (SMT).
- Demonstrate that rooting an induction program in content-specific pedagogy produces teachers who are more confident in their ability to meet the needs of students and more competent in meeting the SMT curriculum and teaching standards.

- Provide leadership and growth opportunities for more advanced teachers who can take on mentoring roles, thus building overall district capacity.
- Increase the diversity of new mathematics and science teachers by recruiting teachers from groups traditionally underrepresented in the profession.

Using evaluation and program review to improve teachers and programs

Many induction programs that currently exist are district-run with few, if any, resources provided by states. To take advantage of current initiatives, a few states are conducting program reviews to assess quality and identify promising practices. In 1998, the Arizona Board of Regents funded a statewide study of district induction programs to assess how new mathematics and science teachers perceived their early teaching experiences, and to identify factors in mentoring programs that enhance teaching practice.[11] The study found that, in general, new teachers valued the assistance they received from mentors. Mentors were critical in helping new teachers obtain their professional certificate, strengthening their development as professional educators, and reducing their isolation within the school environment. The study directors also uncovered gaps in district induction programs, making the following recommendations:

- Increase the number of formal mentoring programs in the districts. Too few districts have formal mentoring programs. Almost half of the teachers studied had no exposure to mentors or a formal mentoring program.
- Increase support for formal mentoring programs. Limited resources were available to districts to develop formal mentoring programs.
- Formal mentoring programs for new teachers should be developed and conducted collaboratively by school district and university personnel. This will link pre-service experience with the first years of practice, thus facilitating new teachers' transition into the school culture.
- Veteran mathematics and science teachers should mentor new teachers in the discipline. A substantial number of new teachers are teaching courses outside of their expertise and new teachers want additional instructional support in the discipline.
- Mentors should meet often with new teachers, observing and providing them ample feedback on their teaching.
- Mentoring programs should extend beyond a teacher's first year to support on-going professional development of new teachers.
- Both pre-service and mentoring programs should provide mathematics and science teachers increased information about classroom management, educational technology and student assessment.

Conclusion

State-level support for beginning teachers offers another important element to systemic strategies aimed at high quality education for our nation's children. Several state higher education agencies have added teacher induction to recent requests for proposals under the competitive grant component of the

Eisenhower Professional Development Program. Following the goals of the federal program, these new initiatives are aimed at sustained, intensive and high quality professional development based on rigorous content-based knowledge. If they are well-designed they will expand the pool of effective models and help address critical state needs to build the knowledge and pedagogical skills of beginning teachers.

To ensure their effectiveness, the programs should build on what current studies indicate are working:

- Programs should be based in schools and classrooms.
- New models should be designed especially for novice teachers and differentiate between teachers in their first job, mid-career changers, and veterans who have changed grade levels or subject areas.
- Programs need sufficient financial resources to compensate mentor teachers for their participation and to allow mentors to work with novice teachers during class time throughout the first two years of teaching.
- Programs should be evaluated and new or scaled-up efforts should be based on effective practice.

Finally, because states are moving in new directions by adding induction programs to their education and teacher reform efforts, more comparative data across programs is needed to identify program components and capacity to support beginning teachers. Additionally, empirical studies at the national level are needed to examine whether critical characteristics, such as mentoring and peer support, are effectively implemented within local and state models. Such work will help states build effective initiatives and learn from best practices of others.

Selected Eisenhower Higher Education Programs on Teacher Induction

California

State Higher Education Coordinator:
Linda Barton White, California Postsecondary Education Commission
(916) 322-7984
www.cpec.ca.gov

Professional Instruction for New and Established Teachers (PINET)
Linda Lipner
University of California, Berkeley and Hayward and Berkeley Unified School Districts
(510) 642-0193

Science, Mathematics, Pre-Service Partnership Program (SMP3)
James Marshall
California State University, Fresno and Fresno Unified School District
(559) 278-0239

Exploratorium Teacher Induction Program

Dennis Bartels and Linda Shore
Exploratorium Teacher Induction Program and San Francisco and San Mateo Unified School Districts
(415) 561-0313 ext. 5
www.exploratorium.edu

Georgia

State Higher Education Coordinator:
Edward J. Davis, University of Georgia
(706) 542-4043
www.coe.uga.edu/eisenhower

Enhanced PRIME Project
Patricia Wilson
University of Georgia, Athens
(706) 542-4547

Beyond the Classroom: Community-Based Environmental Education at the ENSAT Center
Deborah Tippins, Lynn Bryan, and Mike Wharton, University of Georgia
(706) 542-1763

Hawaii

State Higher Education Coordinator:
Thomas Sileo, University of Hawaii
(808) 956-7704

Mathematics Content for Middle Schools
Barbara Dougherty
University of Hawaii at Manoa
(808) 956-4988

Mississippi

State Higher Education Coordinator:
Pearl Strickland Pennington, Mississippi Board of Trustees of State Institutions of Higher Learning (601) 982-6501

The Mentor Institute: Molding Excellent New Teachers of Reading/Writing
Martha Cheney, Bobby Papasan and Cecil Weeks
University of Mississippi and North Mississippi Education Consortium
(601) 232-7482

Nebraska

State Higher Education Coordinator:
Kathleen Fimple, Nebraska Coordinating Commission for Postsecondary Education
(402) 471-0031

http://nol.org/NEpostsecondaryed

Teacher Induction Mentoring and Educational Support (TIMES)
Sharon K. Davis
University of Nebraska, Lincoln
(402) 472-6208

New Jersey

State Higher Education Coordinator:
Maria Rosado, New Jersey Department of Education
(609) 633-8014

School-Based Professional Development Activities
Brian Chinni
Fairleigh Dickinson University
(973) 443-8384

Ohio

State Higher Education Coordinator:
Marlene Rushay, Ohio Board of Regents
(614) 752-9475
www.regents.state.oh.us

Fostering Mathematics Education and Teacher Development through Mentor/Novice Teacher Paired Relationships
Michael Mikusa and Judith A. Melillo
Kent State University
(330) 672-2580

West Virginia

State Higher Education Coordinator:
Mark W. Stotler, State College and University Systems of West Virginia
(304) 558-0262

Partnership for Preparing Professionals
Kathleen Steber
Wheeling Jesuit University and Ohio County Schools
(304) 243-2175

Endnotes

[1] National Association of State Directors of Teacher Education and Certification, *The NASDTEC Manual on the Preparation and Certification of Educational Personnel 1998-99* , (Dubuque, IA: Kendall/Hunt Publishing, Inc., 1998).

[2] Hirsch, Eric, Julie E. Koppich and Michael S. Knapp, *What States Are Doing to Improve the Quality of Teaching, a Brief Review of Current Patterns*

and Trends , Center for the Study of Teaching and Policy (Seattle, Washington: University of Washington, December 1998). National Commission on Teaching and America's Future, *What Matters Most: Teaching for America's Future* (New York, NY: NCTAF, 1996).

[3] For a comprehensive review of the literature and initiatives that were developed in the 1980s, see *Assisting the Beginning Teacher* (Reston, VA: Association of Teacher Educators, 1989); Hirsch, et. al.; and NCTAF.

[4] Pelavin Research Institute U.S.A., *From Students of Teaching to Teachers of Students: Teacher Induction Around the Pacific*, Asian-Pacific Economic Cooperation (APEC) Education Forum, Human Resources Development Working Group (Washington, D.C: U.S. Department of Education, January 1997).

[5] U.S. Department of Education, *Teacher Quality: A Report on the Preparation and Qualifications of Public School Teachers* (Washington, D.C.: U.S. Department of Education, National Center for Education Statistics January 1999).

[6] Fideler, Elizabeth F. and David Haselkorn, *Learning the Ropes: Urban Teacher Induction Programs and Practices in the U.S.* (Belmont, MA: Recruiting New Teachers, Inc., July 1999).

[7] NCTAF, *What Matters Most: Teaching for America's Future* .

[8] U.S. Department of Education, *Teacher Quality*.

[9] Louisiana State Department of Education, *Louisiana Teacher Assistance and Assessment Program* (Baton Rouge, LA: Louisiana State Department of Education, 1998).

[10] *Texas Teacher Recruitment and Retention Study* (Austin, Texas: Texas Education Agency, Texas Higher Education Coordinating Board, State Board for Educator Certification, February 1999).

[11] Luft, Julie A. and Wylie Cox, *A Report on Pre-Service and Mentoring Programs in Arizona for Mathematics and Science Teachers*, Arizona Board of Regents, Eisenhower Mathematics and Science Program (Tempe, Arizona: University of Arizona, August 1998).

Teacher Success is a policy report published periodically by the SHEEO/ Eisenhower Higher Education Coordinators Network. Your comments regarding the content or information to be incorporated in future issues should be directed to Esther Rodriguez, 303-299-3657.

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